REMARKS/ARGUMENTS

Claims 32-63 are pending. By this Amendment, claims 32 and 52 are amended. Reconsideration in view of the above amendments and the following remarks is respectfully requested.

At the outset, Applicant respectfully requests that the Final Rejection be withdrawn since the finality of such rejection has been made prematurely. Specifically, the Final Rejection fails to address several of the features of the claims which were specifically argued in the December 16, 2008 Amendment, which arguments were not addressed in the Final Rejection. See, for example, the traversals presented below in respect to claims 44, 45 and 52. As a result, Applicant respectfully requests that the finality of the rejection be withdrawn, and that the amendments included herewith be entered as a matter of right.

In the Office Action, claims 1-19 were rejected under 35 U.S.C. §112, second paragraph. This rejection is clearly in error since claims 1-19 were canceled, and none of the language of concern which is specified in the Office Action appears in pending claims 32-63.

Claims 32-63 were rejected under 35 U.S.C. §103(a) over Pelletier. This Final Rejection includes the errors that follow.

1. Pelletier does not teach or suggest an outer rail that has a yield point exceeding that of the base rail (claims 32 and 52).

Independent claim 32 is directed to a guide rail of compound type for guiding interaction with a wheel of a unit travelling along the rail. The guide rail comprises an outer rail made of sheet metal and a base rail, wherein the outer rail has a yield point exceeding that of the base rail. The guide rail and outer rail are fixed adhesively relative to each other by a glue joint according to claim 32. Claim 52 is directed to an analog method, and which includes forming an outer rail

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and a base rail, and providing the outer rail with a higher yield limit compared to the base rail through hardening and fixing the outer rail on the receptacle form on the base rail. The claimed guide rail is simple and easy to manufacture and exhibits improved properties with regard to both wear resistance and resistance to surface fatigue. The claimed guide rail may provide a dampening effect and is thereby considerably more quiet than currently known rails.

Pelletier discloses a compound rail having a base rail and an outer rail. The compound rail is made of different materials (stainless steel and aluminum in the outer rail and base rail respectively). In the statement of the rejection on pages 3 and 4 of the Office Action, the Examiner does not address the feature in claims 32 and 52 that the outer rail has a yield point exceeding that of the base rail. However, in the "response to arguments" section, the Examiner reveals that he has interpreted that the base rail will allegedly yield sooner than the outer rail based on the construction of the base rail. "The base rail is shown to have grooves or slots 32 between the head and the web of the rail. These spaces will allow for flexure of the rail as weight is applied to the rail. Therefore, the head of the rail will flex or yield before the outer rail layer, being of solid construction."

The Examiner's position is clearly untenable. First, Pelletier does not teach or disclose any information as to the relative yield strengths of the outer rail relative to the base rail. Second, Pelletier suggests the use of stainless steel and aluminum without specifying the tensile properties, manufacturing process, purity and composition of the specific selected materials. Thus, Pelletier's stainless steel may have the same, higher or lower yield strength compared to aluminum. However, it is well known for a person skilled in the art that aluminum has a yield point usually greater than stainless steel depending on the materials selected, e.g., aluminum may have a tensile strength $R_{0.2}$ of 680 MPa while stainless steel normally has a tensile strength of

520 MPa. Therefore, Pelletier teaches the opposite to what is claimed. On this basis alone, the final rejection should be withdrawn and the case passed to issue.

2. Pelletier does not teach or suggest that the outer rail is provided with a higher yield limit compared to the base rail through hardening (claim 52).

Method claim 52 includes the step of providing the outer rail with a higher yield limit compared to the base rail *through hardening*. In the December 16, 2008 Amendment, Applicant provided specific arguments to this feature (see page 9). The final rejection does not provide any response to this argument.

3. Pelletier does not teach or suggest that the outer rail and the base rail are fixed adhesively relative to each other (claims 32 and 52).

Claim 32 sets forth a guide rail including an outer rail and a base rail that are fixed adhesively relative to each other by a glue joint. Claim 52 includes the step of adhesively fixing the outer rail on … the base rail by gluing. In addition, claim 33, dependent on claim 32, specifies that the glue joint comprises conductive glue. Dependent claim 41 specifies that a layer of elastomeric material is arranged between the outer rail and the base rail in which the parts are joined together through glue. Dependent claim 55 specifies that a layer of elastomeric material is arranged between the outer rail and the receptacle section of the base rail and that the outer rail, base rail and filler layer are joined together through gluing.

As acknowledged in the Final Rejection, Pelletier does not show that the two rails are glued together. However, the Examiner takes the position that it would have been obvious to one of ordinary skill in the art that conductive glue (claim 33) can be used as the functional equivalent to welding in regards to adhering and attaching two like parts together. According to the Examiner, this functional equivalent can be substituted with the expected result that a

conductive glue can be applied by any worker and not one specifically skilled at welding therefore allowing for a faster and more efficient manufacturing of the assembly.

The Examiner has not presented any substantial evidence as to the equivalence of the use of adhesives and welding, or that conductive glue could be used as a functional equivalent to welding.

Compound guide rails have been known for almost one hundred years and all of them involve arranging a facing strip of wear resistant material as an outer rail into fixed contact with the main body as a base rail formed of a less expensive material. In later years there was a need to provide the compound guide rails with the ability to supply electric power. To reduce weight, the mounting body is generally made of aluminum or aluminum alloy. The wear plate is therefore usually made from stainless steel, which is more wear resistant to wear than aluminum or aluminum alloy.

Importantly, among the different fastening methods suggested over the years, all of them have one feature in common: namely they are all based on mechanical locking of the outer rail on the base rail or a combination of mechanical locking and another fastening means which ensure permanent fastening of the outer rail of the base rail. The supplemental fastening means generally consist of spiking, riveting, or welding to secure the outer rail against movement in the longitudinal translation on the head of the base rail and to ensure an adequate quality of electrical conduction between the two components of the rail. The main fastening method is based on mechanical locking such as snap connecting.

In Pelletier, the outer rail is generally C or U-shaped in cross-section and is inverted so that the concave part opening of the outer rail faces the head of the base rail. The outer rail meets flush with base rail with a generally flat surface at the top of the base rail and two arms

generally extending adjacent the two sides of the base rail and tapering inward towards the web of the base rail. The outer rail is fitted to the base rail by pressure on the downward extending sides and the two are also welded together.

The compound guide rail of Pelletier has a number of drawbacks including at least the following:

- insufficient contact area for efficient supply of electrical current between the outer rail and the head of the base rail;
- limitation of the selection materials to be used as the base rail and outer rail because of the need to rely on a constant pressure force exerted between the outer rail and the head of the base rail in order to maintain the two electrically conductive faces firmly together at all times;
- limitation and selection of cross-sections such as C shape in order to achieve a requisite snap effect;
- a limitation of selection of manufacturing methods for the base rail since there is a need to divide the head into two halves defining between them a longitudinal slot in order to create a requisite elastic flexible configuration for fixing the outer rail on the base rail by snap effect.

Pelletier's mechanical snap connection between the outer rail and the base rail is complemented by fastening means which ensure permanent fasting of the outer rail on the base rail. The need to achieve a mechanical snap connection effect limits the possibilities to give the opposing section such a design that an effective surface contact area is achieved which is necessary to bring about an effective supply of electrical current between the head and the base rail and the outer rail. By contrast, the instant compound rail does not rely on any mechanical

connection between the outer rail and the base rail which are allowed to be formed with corresponding opposing or exact matching sections such that the outer rail can be joined to the base rail at right angles to their longitudinal direction of the parts. Stated differently, so that the outer rail immediately and with excellent surface contact can be placed onto the receptacle section of the base rail such that an effective area for a supply of electrical current between the head of the base rail and the outer rail is achieved.

Pelletier's snap connection limits the possibilities to select the material used because of the need for elastic flexing configuration in at least one of the co-acting materials. In order to achieve this flexing configuration, Pelletier designed the mounting body of the rail with halves which can flex elastically relative to its base. Because of the need for the base to flex, Pelletier is limited to the materials having relatively low stiffness, or elastic modulus when materials having relatively high elastic modulus are excluded and cannot be used. The present compound guide rails have no limitations whatsoever when it comes to the selection of material or combination of materials since there is no need for either the outer rail or the base rail to be flexible.

Pelletier's snap connection co-acting parts must be provided with a constriction to achieve the desired pinch or snap effect. Pelletier uses an outer rail that is C formed in cross-section to achieve the pinch effect. It should be understood that the need for a pinch effect affects the convex outside of the outer rail and the possibilities to shape it for an effective guided interaction with the periphery of the railway wheel. As a consequence, the outer rail of Pelletier is provided with side surfaces that are angled inwardly and extending towards each other such that the resulting head of the rail is wider at the top than at the bottom. By contrast, the instant compound guide rail, because there is not need for a snap effect, allows the outer rail to be

shaped with essentially flat surfaces and parallel side surface adjoining at right angles, i.e., which is ideal for cooperation with the rail wheel and also very similar to any common railroad rail.

Pelletier's reliance on a snap connection wherein the head of the base rail is divided into two halves complicates not only materials that can be used, but also limits the methods that can be used to manufacture the base rail. Hence, Pelletier selects aluminum as material for the base rail since the relatively complicated shape is ideal to be extruded from aluminum. However, the claimed compound guide rail has no such limitations and since the outer rail is glued onto the base rail the engineer is not only free to select any suitable material, but also any method of manufacturing the base rail.

4. Pelletier does not teach or suggest an outer rail that comprises a hardened material (claim 44) or that the hardened material is boron steel (claim 45).

Claim 44 specifies that the outer rail comprises a hardened material, and claim 45 specifies that the hardened material is boron steel. Applicant specifically traverses the rejection of these claims on page 9 of the December 16, 2008 Amendment. In response, the Examiner has taken the position that the claimed features are method limitations and therefore simply ignored these features. The rejection is clearly in error as the "hardened material" and the "boron steel" are clearly structural recitations. Withdrawal of the rejection is respectfully requested.

5. Pelletier does not teach or suggest that the outer rail exhibits a yield limit that at least attains values in the interval of 900-1300 MPa (claim 47).

Claim 47 specifies that the outer rail exhibits a yield limit that at least attains values in the interval of 900-1300 MPa. In the Office Action, the Examiner acknowledges that Pelletier does not teach or disclose this range. However, the Examiner then takes the position that it would have been an obvious matter of design choice. This reasoning is fatally flawed in that Pelletier does not in the first instance appreciate that the yield point of the inner and outer rails

can be manipulated to provide the advantages described above. Moreover, since Pelletier does not recognize manipulation of the yield limit to be result effective, it cannot be obvious to design Pelletier's limit in the claimed range of 900-1300 MPa.

In addition, regarding claims 43-45 and 48-50, the Examiner states that these claims recite a method limitation in an apparatus claim. The method limitations have not been given patentable weight per MPEP §2113. However, claim 43 specifies that the outer rail and the base rail respectively comprise different types of material. This is structural in nature. Claim 44 specifies that the outer rail comprises a hardened material, and claim 45 specifies that the hardened material is boron steel – both structural features as mentioned above. Claim 48 specifies a rollformed and hardened sheet metal. At least the sheet metal aspect of the claim is structural in nature. Claim 49 specifies that the base rail comprises a rolled profile. A "profile" is a structural feature, and the term "rolled" is an adjective which limits the type of profile involved. Thus, a "rolled profile" is a structural feature. Similar remarks apply to claim 50.

In view of the above amendments and remarks, Applicant respectfully submits that all the claims are patentable and that the entire application is in condition for allowance.

The Commissioner is hereby authorized to charge any deficiency, or credit any overpayment, in the fee(s) filed, or asserted to be filed, or which should have been filed herewith (or with any paper hereafter filed in this application by this firm) to our Account No. 14-1140 under Order No. PTB-4448-44.

Should the Examiner believe that anything further is desirable to place the application in better condition for allowance, he is invited to contact the undersigned at the telephone number listed below.

Respectfully submitted,

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